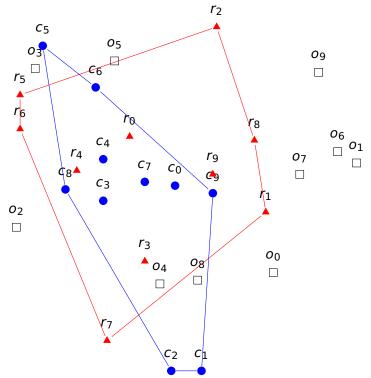
▶testA

Diagram



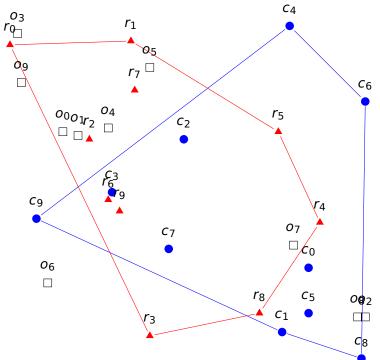
```
Input
10 10 10
(51/10,53/10)
(58/10,4/10)
(50/10,4/10)
(32/10,49/10)
(32/10,60/10)
(16/10,90/10)
(30/10,79/10)
(43/10,54/10)
(22/10,52/10)
(61/10,51/10)
(39/10,66/10)
(75/10,46/10)
(62/10,95/10)
(43/10,33/10)
(25/10,57/10)
(10/10,77/10)
(10/10,68/10)
(33/10,12/10)
(72/10,65/10)
(61/10,56/10)
(77/10,30/10)
(99/10,59/10)
(9/10,42/10)
(14/10,84/10)
(47/10, 27/10)
```

(35/10,86/10) (94/10,62/10) (84/10,56/10) (57/10,28/10) (89/10,83/10)

Output
Safe: 2
Robbed: 0
In danger: 8

⊳testB



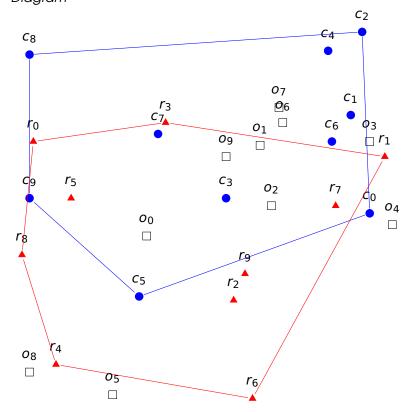


```
Input
10 10 10
(83/10,33/10)
(76/10, 16/10)
(50/10,67/10)
(31/10,53/10)
(78/10,97/10)
(83/10,21/10)
(98/10,77/10)
(46/10,38/10)
(97/10,9/10)
(11/10,46/10)
(4/10,92/10)
(36/10,93/10)
(25/10,67/10)
(41/10, 15/10)
(86/10,45/10)
(75/10,69/10)
(30/10,51/10)
(37/10,80/10)
(70/10,21/10)
(33/10,48/10)
(18/10,69/10)
(22/10,68/10)
(98/10,20/10)
(6/10,95/10)
(30/10,70/10)
```

(41/10,86/10) (14/10,29/10) (79/10,39/10) (96/10,20/10) (7/10,82/10)

Output
Safe: 2
Robbed: 4
In danger: 4

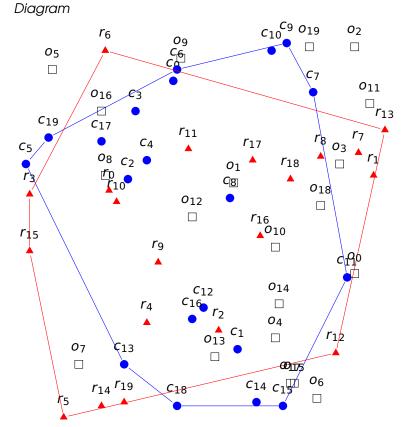
>testCDiagram



Input 10 10 10 (93/10,51/10)(88/10,77/10) (91/10,99/10)(55/10,55/10) (82/10,94/10)(32/10,29/10) (83/10,70/10)(37/10,72/10) (3/10, 93/10)(3/10,55/10)(4/10,70/10)(97/10,66/10)(57/10,28/10)(39/10,75/10)(10/10,11/10)(14/10,55/10)(62/10, 2/10)(84/10,53/10)(1/10,40/10)(60/10,35/10)(34/10,45/10)(64/10,69/10)(67/10,53/10) (93/10,70/10) (99/10,48/10) (25/10,3/10) (70/10,75/10) (69/10,79/10) (3/10,9/10) (55/10,66/10)

Output
Safe: 6
Robbed: 0
In danger: 4

⊳testD

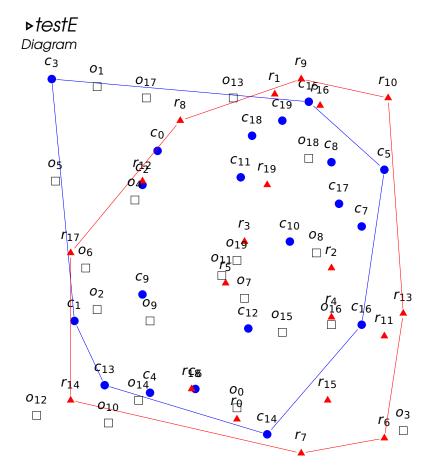


```
Input
20 20 20
(40/10,89/10)
(57/10,18/10)
(28/10,63/10)
(30/10,81/10)
(33/10,68/10)
(1/10,67/10)
(41/10,92/10)
(77/10,86/10)
(55/10,58/10)
(70/10,99/10)
(66/10,97/10)
(86/10,37/10)
(48/10,29/10)
(27/10,14/10)
(62/10,4/10)
(69/10,3/10)
(45/10,26/10)
(21/10,73/10)
(41/10,3/10)
(7/10,74/10)
(23/10,60/10)
(93/10,64/10)
(52/10,23/10)
```

(2/10,59/10)(33/10,25/10)(11/10,0/10)(22/10,97/10)(89/10,70/10) (79/10,69/10)(36/10,41/10)(25/10,57/10)(44/10,71/10)(83/10,17/10)(96/10,76/10)(21/10, 3/10)(2/10,44/10)(63/10,48/10)(61/10,68/10)(71/10,63/10)(27/10,4/10)(88/10,38/10) (56/10,62/10)(88/10,98/10)(84/10,67/10)(67/10,21/10)(8/10,92/10)(78/10,5/10)(15/10,14/10)(22/10,64/10) (42/10,95/10) (67/10,45/10)(92/10,83/10)(45/10,53/10)(51/10, 16/10)(68/10,30/10)(72/10,9/10)(21/10,81/10)(71/10,9/10)(79/10,56/10)(76/10,98/10)

Output

Safe: 11 Robbed: 2 In danger: 7



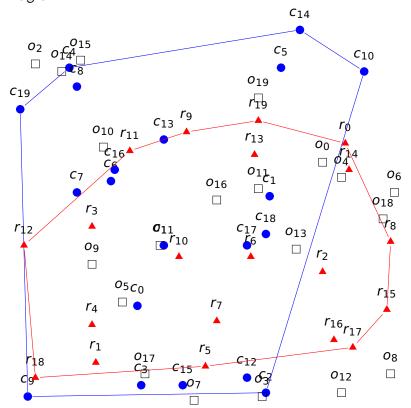
```
Input
20 20 20
(32/10,80/10)
(10/10,35/10)
(28/10,71/10)
(4/10,99/10)
(30/10, 16/10)
(92/10,75/10)
(42/10, 17/10)
(86/10,60/10)
(78/10,77/10)
(28/10,42/10)
(67/10,56/10)
(54/10,73/10)
(56/10,33/10)
(18/10, 18/10)
(61/10,5/10)
(72/10,93/10)
(86/10,34/10)
(80/10,66/10)
(57/10,84/10)
(65/10,88/10)
(53/10,9/10)
(63/10,95/10)
(78/10,49/10)
```

(55/10,56/10)(78/10,36/10)(50/10,45/10)(92/10,4/10)(70/10,0/10)(38/10,88/10)(70/10,99/10)(93/10,94/10)(92/10,31/10)(28/10,72/10)(97/10,37/10)(9/10,14/10)(77/10,14/10)(75/10,92/10)(9/10,53/10)(41/10,17/10) (61/10,71/10)(53/10,12/10)(16/10,97/10)(16/10,38/10)(97/10,6/10)(26/10,67/10)(5/10,72/10)(13/10,49/10)(55/10,41/10)(74/10,53/10)(30/10,35/10)(19/10,8/10)(49/10,47/10)(0/10, 10/10)(52/10,94/10)(27/10,14/10)(65/10,32/10)(78/10,34/10)(29/10,94/10)(72/10,78/10)(53/10,51/10)

Output

Safe: 15 Robbed: 1 In danger: 4

*▶testF*Diagram



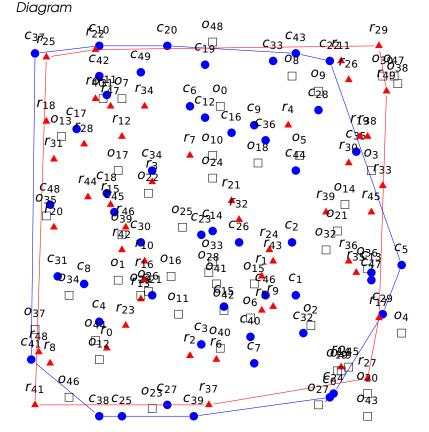
```
Input
20 20 20
(31/10, 26/10)
(66/10,55/10)
(65/10,3/10)
(32/10,5/10)
(13/10,89/10)
(69/10,89/10)
(24/10,59/10)
(15/10,56/10)
(15/10,84/10)
(2/10,2/10)
(91/10,88/10)
(38/10,42/10)
(60/10,7/10)
(38/10,70/10)
(74/10,99/10)
(43/10,5/10)
(25/10,62/10)
(60/10,42/10)
(65/10,45/10)
(0/10,78/10)
(86/10,69/10)
(20/10,11/10)
(80/10,35/10)
```

(19/10,47/10)(19/10,21/10)(49/10,10/10)(61/10,39/10)(52/10, 22/10)(98/10,43/10)(44/10,72/10)(42/10,39/10)(29/10,67/10) (1/10,42/10)(62/10,66/10)(87/10,62/10)(97/10,25/10)(83/10,17/10)(88/10,15/10)(4/10,7/10)(63/10,75/10)(80/10,64/10)(37/10,42/10)(4/10,90/10)(64/10,2/10)(85/10,60/10)(27/10, 27/10)(99/10,56/10)(46/10,1/10)(98/10,8/10) (19/10, 37/10)(22/10,68/10)(63/10,57/10)(85/10,3/10)(73/10,41/10)(11/10,88/10)(16/10,91/10)(52/10,54/10)(33/10,8/10)(96/10,49/10)(63/10,81/10)

Output

Safe: 10 Robbed: 1 In danger: 9

▶testG



```
Input
50 50 50
(80/10,5/10)
(71/10,32/10)
(70/10,46/10)
(46/10,19/10)
(19/10,25/10)
(99/10,40/10)
(43/10,82/10)
(60/10,14/10)
(15/10,35/10)
(60/10,77/10)
(19/10,98/10)
(21/10,85/10)
(47/10,79/10)
(91/10,38/10)
(49/10,49/10)
(52/10,29/10)
(54/10,75/10)
(13/10,76/10)
(21/10,59/10)
(47/10,93/10)
(37/10,98/10)
(33/10,32/10)
(80/10,94/10)
```

(46/10,48/10)(81/10,6/10)(25/10,0/10)(56/10,46/10)(37/10,3/10)(77/10,81/10)(94/10,27/10)(30/10,46/10)(8/10,37/10)(73/10,22/10)(65/10,94/10)(33/10,65/10)(87/10,70/10)(63/10,73/10)(2/10,96/10)(19/10,0/10)(44/10,0/10)(59/10,21/10)(1/10, 15/10)(19/10,90/10)(71/10,96/10)(71/10,65/10)(23/10,54/10)(63/10,32/10)(91/10,36/10)(6/10,56/10)(30/10,91/10)(21/10, 18/10)(62/10,37/10)(43/10,16/10)(33/10,62/10)(69/10,77/10)(62/10,28/10)(50/10,15/10)(43/10,69/10)(6/10,14/10)(65/10,29/10)(31/10,41/10)(83/10,94/10)(25/10,74/10)(30/10,31/10)(83/10,13/10)(22/10,56/10) (31/10,36/10)(93/10,26/10)(5/10,78/10)(88/10,74/10)(7/10,50/10)(54/10,57/10)(18/10,97/10)(26/10,24/10)(64/10,44/10)(5/10,95/10)(85/10,89/10)

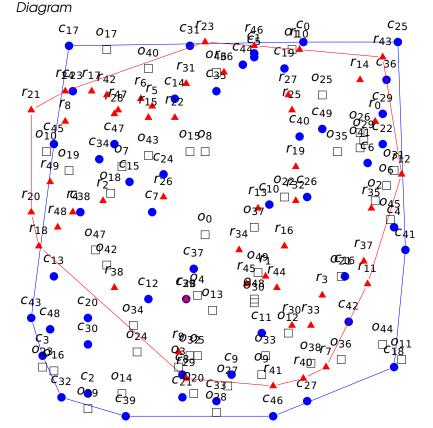
(90/10,10/10)(15/10,72/10)(93/10,98/10)(85/10,67/10)(7/10,68/10)(56/10,52/10)(94/10,61/10)(31/10,82/10)(87/10,38/10) (85/10,41/10)(48/10,3/10)(90/10,74/10) (79/10,54/10)(18/10,84/10)(2/10,3/10)(25/10,44/10)(65/10,41/10)(16/10,58/10)(91/10,54/10)(26/10,50/10)(22/10,82/10)(3/10,17/10)(95/10,86/10)(51/10,82/10) (24/10,36/10)(75/10,24/10)(91/10,65/10)(99/10,22/10)(72/10,69/10)(59/10,26/10)(25/10,84/10)(70/10,90/10)(77/10,86/10)(49/10,69/10) (40/10,27/10)(19/10, 15/10)(9/10,74/10)(84/10,56/10)(60/10,35/10) (38/10,37/10)(24/10,65/10)(61/10,67/10)82/10,12/10) (90/10,6/10)(82/10,49/10)(32/10,59/10)(33/10,2/10)(49/10,63/10) (41/10,50/10)(32/10,33/10)(77/10,3/10)(48/10,38/10)(30/10,32/10)(94/10,90/10)

(20/10,84/10) (79/10,44/10) (49/10,41/10) (11/10,32/10)(5/10,53/10) (90/10,39/10) (2/10,23/10)(98/10,88/10)(25/10,48/10) (51/10, 18/10)(50/10,35/10)(52/10,28/10) (90/10,0/10) (18/10,20/10)(85/10,13/10)(11/10,5/10)(97/10,90/10)(49/10,99/10) (83/10,12/10)

Output

Safe: 40 Robbed: 3 In danger: 7

⊳testH



```
Input
50 50 50
(72/10,99/10)
(59/10,96/10)
(15/10,6/10)
(3/10,16/10)
(96/10,50/10)
(59/10,95/10)
(89/10,67/10)
(32/10,54/10)
(40/10,11/10)
(53/10,11/10)
(63/10,56/10)
(61/10,22/10)
(31/10,31/10)
(6/10,37/10)
(38/10,84/10)
(26/10,62/10)
(83/10,37/10)
(10/10,98/10)
(96/10, 13/10)
(67/10,92/10)
(15/10,26/10)
(40/10,5/10)
(93/10,72/10)
```

(11/10,86/10)(35/10,64/10)(97/10,99/10)(73/10,58/10)(73/10,4/10)(41/10,31/10)(93/10,80/10)(15/10, 19/10)(42/10,98/10) (8/10,5/10)(49/10,4/10)(18/10,68/10)(49/10,86/10) (94/10,89/10) (43/10,39/10)(13/10,54/10)(25/10,0/10)(71/10,74/10)(99/10,44/10)(84/10,25/10)(0/10,26/10)(56/10,93/10)(6/10,72/10)(64/10,0/10)(22/10,72/10)(5/10,23/10)(77/10,76/10)(91/10,78/10)(62/10,37/10)(19/10,57/10)(77/10,32/10)(11/10,54/10)(32/10,82/10)(29/10,84/10)(78/10, 13/10)(9/10,78/10)(39/10,17/10)(71/10,97/10)(89/10,35/10)(98/10,64/10)(60/10,55/10)(87/10,89/10)(31/10,79/10) (67/10,45/10)(16/10,86/10)(2/10,45/10)(70/10,66/10)(0/10,54/10)(0/10,81/10)(38/10,79/10)(46/10,99/10)(9/10,86/10)(69/10,81/10)(35/10,58/10)

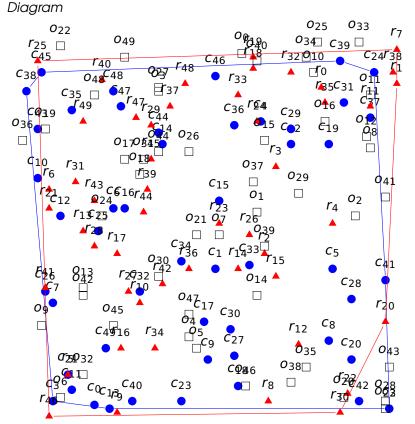
(68/10,85/10)(22/10,80/10)(41/10, 10/10)(69/10,24/10) (41/10,88/10) (70/10,57/10)(74/10,24/10)(55/10,44/10)(90/10,55/10) (51/10,91/10)(88/10,41/10)(22/10,34/10)(41/10,31/10) (72/10,10/10)(64/10,8/10)(20/10,85/10)(93/10,95/10)(65/10,34/10)(57/10,35/10)(59/10,98/10) (23/10,81/10)(7/10,50/10)(5/10,62/10)(46/10,48/10)(69/10,97/10)(91/10,57/10)(39/10, 13/10)(44/10,32/10) (44/10,16/10) (94/10,61/10)(24/10,66/10)(46/10,70/10)(61/10,11/10)(4/10,70/10)(98/10,15/10)(68/10,22/10)(48/10,28/10)(24/10,6/10)(42/10,70/10) (6/10, 12/10)(20/10,97/10)(21/10,59/10)(10/10,65/10)(43/10,6/10) (82/10,37/10)(67/10,58/10)(3/10,13/10)(28/10,17/10)(77/10,85/10)(87/10,75/10) (52/10,8/10) (49/10,1/10) (88/10,73/10)(59/10,30/10)

(96/10,65/10) (42/10,16/10) (62/10, 16/10)(27/10,24/10)(81/10,70/10) (82/10, 15/10)(59/10,50/10)(74/10, 14/10)(15/10,2/10) (31/10,92/10) (87/10,71/10)(20/10,40/10) (31/10,69/10) (93/10,19/10)(95/10,52/10)(49/10,91/10) (17/10,44/10)(59/10,31/10) (60/10,38/10)

Output

Safe: 46 Robbed: 1 In danger: 3

⊳testl



Input 50 50 50 (19/10,3/10)(51/10,39/10)(97/10, 2/10)(8/10,4/10)(63/10,78/10)(82/10,39/10)(24/10,55/10) (8/10,30/10)(81/10,20/10)(49/10, 15/10)(4/10,63/10)(13/10,7/10)(10/10,53/10)(23/10,2/10)(37/10,72/10)(52/10,57/10)(27/10,55/10)(48/10,25/10)(57/10,8/10) (81/10,72/10)(87/10,15/10)(12/10,11/10)(71/10,72/10) (42/10,4/10)(93/10,91/10)(20/10,49/10)(6/10,33/10)(56/10, 16/10)(87/10,31/10)(71/10,76/10)55/10,23/10) (85/10,83/10) (31/10,33/10)(60/10,40/10)(42/10,41/10)(13/10,81/10)(56/10,77/10)(92/10,79/10)(1/10,86/10)(84/10,94/10)(29/10,4/10)(96/10,36/10)(89/10,4/10)(4/10,76/10)(36/10,75/10)(5/10,91/10)51/10,90/10) (26/10,82/10)(24/10,86/10)(22/10, 18/10)(79/10,87/10)(99/10,88/10)(64/10,43/10)(67/10,66/10)(82/10,51/10)(12/10,11/10)(7/10,60/10)(99/10,97/10)(65/10,4/10)(25/10,1/10)(31/10,30/10)(92/10,82/10)(73/10,19/10)(16/10,49/10)57/10,39/10) 67/10,37/10) (26/10, 18/10)(25/10,43/10)(61/10,92/10)(61/10,95/10)(96/10,25/10)(7/10,55/10)(86/10,6/10)(52/10,51/10)(62/10,78/10)(4/10,94/10)(60/10,48/10) (28/10,33/10)(19/10,45/10)(34/10,77/10)(84/10,1/10)(14/10,62/10)(71/10,91/10)(57/10,85/10)(35/10, 18/10)(80/10,83/10) (44/10,39/10)(39/10,82/10)(98/10,91/10)(33/10,60/10)(21/10,89/10)(6/10,34/10)(37/10,35/10)(19/10,57/10)(32/10,54/10)(34/10,68/10)(7/10,0/10)(30/10,79/10)(43/10,88/10) (16/10,78/10)(58/10,96/10)(62/10,54/10)(88/10,53/10)(36/10,86/10)(44/10,21/10) (46/10,18/10) (10/10,5/10)(52/10,48/10)(92/10,71/10)(5/10,24/10)(77/10,91/10)(92/10,85/10)(91/10,74/10)(16/10,34/10)(62/10,32/10)(64/10,73/10)(80/10,78/10)(27/10,68/10)(31/10,64/10)(6/10,76/10)(85/10,5/10)(46/10,48/10) (10/10,98/10)(96/10,2/10) (21/10,53/10)(78/10,99/10)(44/10,70/10)(36/10,87/10)(96/10,4/10)(73/10,59/10)(36/10,37/10) (32/10,68/10) (16/10,11/10) (89/10,99/10) (75/10,95/10)(75/10,13/10) (0/10,73/10) (61/10,62/10)(71/10,9/10)(64/10,45/10) (62/10,94/10) (96/10,58/10)(16/10,32/10) (97/10, 13/10)(36/10,70/10)(24/10,24/10)(59/10,8/10) (44/10, 27/10)(19/10,85/10) (27/10,95/10)

Output

Safe: 39 Robbed: 3 In danger: 8

▶testJ

Diagram 088 098 014 022 00 C₁₅ 042 C45 [14 C46 04 $c_{31}\square$ □**□**0@3 ₁C49 c 🔂 ⁷⁷02 r_{57} [™]06607**07**9356⁷⁷⁷ 067rd4301 PG 27 061 *r*99□ <u>r</u>58 Ć**∳**4 **r**₄₽82 04924 <u> 186</u> *r*84▲ C44 r_{80} C70 018 C34

Input 100 100 100 (9/10,80/10)(51/10,80/10)(3/10,9/10)(11/10,85/10)(17/10,32/10)(92/10,43/10)(78/10,38/10)(57/10,32/10)(14/10,32/10)(74/10,36/10)(58/10,71/10)(57/10,82/10)(65/10,68/10)(35/10,94/10)(36/10,73/10)(16/10,98/10)(5/10,68/10)(78/10,9/10)(77/10,90/10)(46/10,94/10)(74/10,90/10)(89/10,53/10)(80/10,98/10) (85/10,94/10)(83/10,59/10)(83/10,41/10)(30/10,40/10)(75/10,48/10)(60/10, 10/10)(42/10,96/10) (35/10,59/10)(94/10,93/10) (79/10,73/10)(2/10,8/10)(63/10,0/10)(55/10,37/10)(42/10,44/10) (42/10,22/10)(95/10,27/10)(17/10,78/10)(87/10,52/10)(71/10,69/10)(92/10,46/10)(69/10,52/10)(9/10,12/10)(0/10,96/10)(23/10,95/10)(89/10,54/10)(68/10,43/10)(62/10,83/10)(95/10,17/10)(72/10,37/10)(14/10, 15/10)(60/10,9/10)(42/10,29/10)(39/10,81/10)(81/10, 10/10)(51/10,25/10)(56/10,20/10)(29/10,17/10)(84/10,29/10) (14/10,59/10)(76/10,55/10)(13/10,44/10)(99/10,76/10)(79/10,94/10)(93/10,52/10)(84/10,7/10)(67/10,44/10)(68/10,9/10)(25/10,7/10)(91/10,58/10)(17/10,94/10)(35/10,26/10)(66/10, 16/10)(95/10,3/10)(97/10,61/10) (62/10,74/10)(17/10,76/10)(70/10,16/10)(4/10,50/10)(62/10,49/10)(2/10,46/10)(57/10,69/10)(42/10,77/10)(30/10,19/10) (85/10,73/10)(77/10,54/10)(19/10,64/10)(32/10,86/10)(80/10,28/10)(89/10,78/10)(89/10,3/10)(4/10,6/10)(31/10,74/10)(74/10,35/10)(76/10,89/10)(85/10,78/10)(35/10,94/10)(99/10,30/10)(71/10,82/10)(49/10,8/10)(55/10,79/10)(63/10,27/10)(43/10,95/10)(13/10,76/10)(75/10,54/10)(6/10,65/10)(9/10,62/10)(23/10,41/10)(36/10,50/10)(76/10, 13/10)(39/10, 13/10)(43/10,74/10)(7/10,95/10)(56/10,31/10)(77/10,58/10)(39/10,32/10)(37/10,54/10)(11/10,32/10) (50/10,24/10)(60/10,77/10)(30/10, 18/10)(94/10,40/10)(80/10, 18/10)(81/10,17/10)(68/10,9/10)(82/10,7/10)(23/10,77/10)(33/10,82/10)(72/10,42/10) (65/10,49/10)(0/10,5/10)(34/10,89/10)(59/10,45/10)(73/10,61/10) (22/10,34/10)(91/10,4/10)(52/10,85/10)(44/10,85/10)(3/10,77/10)(2/10,23/10)(87/10,36/10)(82/10,62/10)(65/10,68/10)(96/10,38/10)(10/10,62/10)(39/10,62/10)(19/10,25/10)(3/10,30/10)(71/10,76/10)(44/10,45/10)(62/10,35/10)(49/10, 15/10)(20/10,46/10)(0/10,76/10)(23/10,54/10)(51/10,62/10)(42/10,34/10) (76/10,7/10)(54/10,73/10)(97/10,16/10) (87/10,37/10)(30/10,58/10)(62/10,33/10)(88/10,85/10)(9/10,32/10)(82/10,72/10)(19/10,32/10)(39/10,92/10)(78/10,91/10)(68/10,53/10)(97/10,19/10)(16/10,39/10) (5/10,92/10)(98/10,11/10)(17/10,48/10)(27/10,56/10)(37/10,57/10)(14/10,51/10)(42/10,3/10)(89/10,52/10)(87/10,71/10)(24/10,59/10)(3/10,15/10)

(51/10,33/10)(6/10,19/10)(87/10,3/10)(90/10,55/10)(94/10,48/10)(99/10,44/10)(11/10,69/10)(44/10,91/10)(25/10,81/10)(0/10,92/10)(33/10,43/10)(47/10,22/10)(95/10,34/10) (93/10,71/10) (45/10,49/10)(86/10,96/10)(34/10,44/10)(67/10,73/10)(99/10,58/10)(28/10,93/10)(58/10,80/10)(89/10,69/10)(49/10,34/10)(60/10,26/10)(67/10,13/10)(18/10,0/10)(56/10,65/10)(74/10,51/10)(52/10,20/10)(74/10,97/10)(69/10,60/10) (94/10,55/10)(4/10,61/10)(29/10,3/10)(71/10,9/10)(48/10,81/10)(89/10,89/10)(3/10,90/10)(75/10, 15/10)(17/10,43/10)(28/10,35/10)(95/10,84/10)53/10,70/10) (87/10,5/10)(90/10,61/10)(54/10,11/10)(21/10,48/10)(18/10,77/10)(62/10,47/10)(32/10,33/10) (57/10,32/10)(67/10,98/10)(22/10,70/10)(89/10,49/10) (85/10,58/10)(92/10,14/10)(93/10,88/10)(98/10,98/10)(10/10,86/10)(3/10,52/10)(47/10,10/10) (15/10,21/10)58/10,33/10) (50/10,72/10)(33/10,83/10)(6/10,90/10)(15/10,25/10)(40/10,89/10) (95/10,29/10)(39/10,80/10)(87/10,83/10)(94/10,33/10)(71/10,45/10)(31/10,33/10)(83/10,87/10)(85/10,82/10)(49/10,52/10)(3/10,7/10)(86/10,54/10)(80/10,71/10)(89/10,38/10)(13/10,56/10)(63/10,53/10)(46/10,10/10) (35/10,37/10)(90/10,22/10) (20/10,37/10)(7/10,44/10)(34/10,91/10)(77/10,17/10)(30/10,15/10)(99/10,79/10) (19/10,55/10)(38/10,57/10)(61/10,70/10)(28/10,50/10)(8/10,41/10) (6/10,23/10)(95/10,4/10)(33/10,30/10)(41/10,76/10)(4/10,62/10)(65/10,64/10)(6/10,99/10)(55/10,35/10)(16/10,37/10)(2/10,67/10)(16/10,22/10)

(22/10,54/10) (79/10,83/10) (77/10,8/10) (85/10,85/10) (49/10,92/10) (61/10,96/10) (96/10,46/10)

Output

Safe: 94 Robbed: 0 In danger: 6